

ABSTRACT OF THE DISCLOSURE

A tray drive mechanism has a simple structure, and yet both an optical disc clamping operation and a tray opening and closing operation can be driven by one feed motor.

The tray drive mechanism comprises: a feed gear and a tray drive gear that are rotated by a feed motor; a rack member to mesh with the feed gear so as to be driven in direction to inner circumference of the optical disc; a plate trigger driven by the rack member so as to slide; and a cam slider to slide in linkage with the plate trigger. When the cam slider is slided in linkage with plate trigger so as to be driven in direction by the tray drive gear meshing with a rack, a boss of the cam slider pushes a slope portion of each of cam grooves and provided in a tray, so that the tray slides to cause a rack of the tray to mesh with the tray drive gear. Thus, the tray is opened and closed by the feed motor.